REGEIVED CENTRAL FAX CENTER

OCT 1 5 2007

Claims 1-24: (canceled)

What is claimed is:

Claim 25 (currently ammended): On a weapon, having a structure including components that engage in dynamic activity upon said weapon being operated and being of the type adapted to carry a load of ammunition, discharge a round, and following a cycle conformed by a sequence of dynamic events typical to said weapon, automatically reload a next round of ammunition from said load,

a battery powered microprocessor based <u>weapon activity detecting and</u> <u>tracking</u> assembly, in combination with <u>a piezoelectric detector transducer means</u>, including provisions to store and run at least one program and to detect and track the depletion process of a load of ammunition, wherein:

said piezoelectric <u>detector</u> transducer means is adapted and adequately coupled to said weapon, as to generate <u>chronologically correlated</u> electrical impulses <u>of magnitudes of duration and intensity</u> substantially resulting from induced stresses, induced into said <u>piezoelectric detector</u> transducer means by the dynamic activity taking place upon said weapon being operated,

and in which, provisions are made as to <u>detect</u>, <u>identify by electrical and logical means</u>, selectively track and correlate in time, portions of said GENERATED <u>sequences of</u> electrical impulses with portions of said weapon operation dynamic event sequence,

in which further provisions are made such that, <u>UPON OPERATING SAID</u>

<u>WEAPON</u>, detected, tracked and correlated portions of electrical impulse sequencesthusly generated, can be utilized SAID MICROPROCESSOR BASED ASSEMBLY,

EXECUTES ACTIVITIES to determine at least if said weapon was discharged and
has automatically reloaded, or if it has only been discharged, <u>by establishing the</u>
prescence or abscence within the electrical pulse sequence thusly generated, of
electrical impulse portions substantially representing those that are typically
generated by the sequence of significant dynamic events taking place when said
weapon discharges and reloads or when it only discharges.

Claim 26 (previously presented): The assembly of claim 25 in which said assembly is adapted to be responsive and to become enabled from a lower power wait state upon said weapon being operated.

Claim 27 (previously presented): The assembly of claim 26 in which said assembly is adapted to automatically return to said lower power wait state.

Claim 28 (currently ammended): The assembly of claim 25 in which said assembly contains at least one having control means provisions.

Claim 29 (currently ammended): The assembly of claim 28, in which <u>further</u> provisions are made; as to allow <u>activating, recalling, altering presets, and programming</u>

or resetting of said assembly by the user by operating said control means.

Claim 30 (previously presented): The assembly of claim 25 in combination with a switching device adapted to function as a weapon component status detector.

Claim 31 (previously presented): The assembly of claim 30 in which said switching device functions also as a control means.

Claim 32 (currently ammended): The assembly of claim 25 in which said transducer means may include including more than one transducer component piezoelectric detector working cooperatively in an electrically unified structure as to generate an electrically combined dynamic event report.

Claim 33 (currently ammended): The assembly of claim 25 in which a weapon operation event detecting means capable of detecting abrupt inclination is used.

Claim 34 (previously presented): The assembly of claim 25 in which said assembly has provisions for activating signal means regarding ammunition load status.

Claim 35 (previously presented): The assembly of claim 34 in which said signal means is visual in nature.

Claim 36 (currently ammended): The assembly of claim 35, in which said VISUAL signal means is conformed by a plurality of luminous colored light-generators adapted to illuminate is conformed by a display that displays a visual report following a pattern adapted to be indicative of in a relation to said load of ammunition being depleted, being said visual signal means adapted to disposed on said weapon as an accessory to said weapon in such manner that it provides to the user with a substantially visible report of the progressive feedback regarding the status consumption of said load of ammunition.

Claim 37 (currently ammended): The assembly of claim 35 36, in which said signal means is built into a <u>functional</u> component integral of said weapon in such manner that it provides to the user with a substantially visible report of the <u>progressive consumption</u> of <u>the status of</u> said load of ammunition <u>while functioning</u> as the <u>component it replaced</u>.

Claim 38 (currently ammended): The assembly of claim 36 in which <u>said visual</u> report indicating pattern is customizable. a correlation between said signal means and the progressive consumption of said load of ammunition can be programmed by the user.

Claim 39 (previously presented): The assembly of claim 25 in which said assembly has non volatile data storage provisions.

Claim 40 (previously presented): The assembly of claim 25 in which said assembly has provisions for establishing and recording on said data storage provisions, date

and time information regarding weapon discharge events.

Claim 41 (currently ammended): The assembly of claim 39, in which provisions are made as to enable embedding and retrieving embed and retrieve user traceable information.

Claim 42 (previously presented): The assembly of claim 39 in which said assembly has access provisions to retrieve previously recorded data.

Claim 43 (previously presented): The assembly of claim 39 in which said data storage provisions include security limiting means for accessing said stored data.

Claim 44 (currently ammended): The assembly of claim 25 in which datacommunication provisions are made, as to allow programmability of the assembly. including access provisions to allow programmability and modification of presets of said assembly.

Claim 45 (currently ammended): The assembly of claim 25 in which the output of said plezoelectric detector transducer means is electrically modified.

Claim 46 (currently ammended): The assembly of claim 45 in which said electrically modified output is digitally managed, which modification of said electrical impulses may include some level of signal conditioning.

Claim 47 (currently ammended): The assembly of claim 45 which modification of said electrical impulses may include conversion into an increased electrical pulse. The assembly of claim 25 in which provisions are made to automatically reset the tracked count to default, by detecting and identifying the dynamic activity that takes place when chambering a round by releasing said weapon spring driven reloading provisions.

Claim 48 (currently ammended): The assembly of claim 25 in which said piezoelectric detector adaptation and coupling into said weapon includes provisions for optimizing dynamic range and frequency response, sensitivity, and directionality of detection.

Claim 49 (new): The assembly of claim 25 including tracking error management provisions of potentially detected spurious or anachronic dynamic events.

Claim 50 (new): The assembly of claim 25 including provisions for storing and utilizing electrical impulse level threshold identification means presets.

Claim 51 (new): The assembly of claim 25 including provisions for storing and utilizing typically expected time frame of occurrance presets for ascertaining the prescence or abscence of a relevant electrical impulse portion correlated to said weapon dynamic activity.

Claim 52 (new): The assembly of claim 25 including provisions for storing and utilizing an electrical impulse duration identification means preset.

Claim 53 (new): The assembly of claim 25 including provisions for storing and utilizing presets for applying synchronized cyclic gating to the less relevant intermediate portions of electrical impulses contained within the electrical impulse sequences generated when operating said weapon.

Claim 54 (new): The assembly of claim 25 including provisions for storing and utilizing presets for synchronized cyclic neutralization of the less relevant intermediate portions of electrical impulses contained within the electrical impulse sequences generated while operating said weapon.

Claim 55 (new): The assembly of claim 25 including provisions for storing, recalling and selectively utilizing at least one parameter preset for at least one electrical impulse microprocessor electrical impulse identifying related activity.

Claim 56 (new): The assembly of claim 25 including provisions to store and recall presets typical to more than one weapon.

Claim 57 (new): The assembly of claim 34 including further provisions for storing and utilizing digitally managed energizing pattern presets for energizing said signal display.

Claim 58 (new): The assembly of claim 57 having control provisions adapted to selectively enable one of said presets.

Claim 59 (new): The assembly of claim 36 in which said visual display is luminous in nature.

Claim 60 (new): The assembly of claim 59 in which said visual signal means is conformed by at least one LED device.

Claim 61 (new): The assembly of claim 60 in which said device is a multicolored LED capable of displaying a plurality of colors.

Claim 62 (new): The assembly of claim 61 utilizing a plurality of multicolor LED PAGE 8/8 * RCVD AT 10/15/2007 12:40:27 PM [Eastern Daylight Time] * SVR:USPTO-EFXRF-2/0 * DNIS:2738300 * CSID:3055291850 * DURATION (mm-ss):07-04